STUDY TITLE: Tenth Information Transfer Meeting and Barrow Information Update Meeting

REPORT TITLE: Tenth Information Transfer Meeting and Barrow Information Update Meeting: Workshop

Proceedings

CONTRACT NUMBER: 1435-01-02-CT-31150 T.O. 36624 (ITM) and T.O. 39070 (IUM).

MMS STUDY NUMBER: OCS Study MMS 2005-036.

SPONSORING OCS REGION: Alaska.

APPLICABLE PLANNING AREAS: Cook Inlet and Beaufort Sea

FISCAL YEAR OF PRODUCT FUNDING: FY 2005

COMPLETION DATE OF REPORT: July 2005

COSTS BY FY: 2005: \$96,500.00 (T.O. 36624 ITM) and \$26,500.00 (T.O. 39070 IUM)

CUMULATIVE PROJECT COST: \$96,500.00 (T.O. 36624 ITM) and \$26,500.00 (T.O. 39070 IUM)

PROJECT MANAGER: Kathy Mitchell

AFFILIATION: MBC Applied Environmental Sciences

ADDRESS: 3000 Redhill Avenue, Costa Mesa, CA 92626

PRINCIPAL INVESTIGATORS: See Principal Investigator for each study listed below under "Description."

KEY WORDS: physical oceanography, fate and effects, biology, protected species, and social science and economics.

BACKGROUND: The Alaska OCS Region has conducted nine Information Transfer Meetings (ITM) in Anchorage and two Information Update Meetings in Barrow as well as other large conferences to summarize and transfer environmental studies information. The Ninth ITM and Barrow IUM were convened in March 2003. Since then, the Alaska OCS Region has funded considerable environmental research by scientists associated with universities, other agencies, consulting firms, etc. In order to improve public accessibility to this information and to exchange similar information with other scientists, the Alaska OCS Region needs to procure logistical support for the Tenth ITM in March 2005.

OBJECTIVES: The specific objectives of this procurement were to:

- Arrange for the meeting facilities.
- Assist the region with the planning and organization of the ITM.
- Arrange for all logistical support of the invited participants.
- Compile Proceedings of the ITM with short abstracts of the presentations and summaries of the discussion sessions.

DESCRIPTION: Presentations on MMS-funded studies were given in the following disciplines:

INTRODUCTION

Welcome to the ITM and the Alaska Environmental Studies Program, *Cleve Cowles* Alaska OCS Region Activities and Environmental Assessment Process, *Paul Stang*

PHYSICAL OCEANOGRAPHY

Water and Ice Dynamics of Cook Inlet, Mark Johnson

Observations of Hydrography in Central Cook Inlet, Alaska, during Diurnal and Semidiurnal Tidal Cycles and Physical Measurements and Seasonal Boundary Conditions in Cook Inlet, Stephen Okkonen (presented by Mark Johnson)

High-Resolution Numerical Modeling of Near-Surface Weather Conditions over Cook Inlet and Shelikof Strait, *Peter Olsson*

Sea Ice Modeling for Beaufort and Chukchi Seas, Matthew Prius

Sea-Ice-Ocean-Oil Spill Modeling System for the Nearshore Beaufort and Chukchi Seas: Improvement and Parameterization (Phase II), *Jia Wang*

Simulation of Landfast Sea Ice along the Alaskan Coast, Mark Hopkins

Development and Testing of an Ocean Model with Wetting and Drying Capability for Tidal Areas (Cook Inlet), Lie-Yauw Oey

Mapping and Characterization of Recurring Spring Leads and Landfast Ice in the Beaufort and Chukchi Seas, Hajo Eicken

Surface Circulation Radar Mapping in Alaskan Coastal Waters: Field Study in the Beaufort Sea and Cook Inlet, David Musgrave (presented by Hank Statscewich)

FATE AND EFFECTS

Continuation of Arctic Nearshore Impact Monitoring In Development Area (cANIMIDA):

cANIMIDA Overview*, Greg Durell

Hydrocarbon Chemistry of Sediments in the Nearshore Beaufort Sea, John Brown

Sources, Concentrations, and Dispersion Pathways for Suspended Sediments and Partitioning of Potential Pollutants Between Dissolved and Particulate Phases, *John H. Trefry*

Integrated Biomonitoring and Bioaccumulation of Anthropogenic Compounds in Biota of the Study Area, Jerry Neff

Long-term Monitoring of the Kelp Community in Stefansson Sound Boulder Patch: Detection of Change Related to Oil and Gas Development, *Ken Dunton*

Persistence of Crude Oil Spills on Open Water, Ian Buist

Improvements in the Fault Tree Approach to Oil Spill Occurrence Estimators for the Beaufort Sea, Frank G.

Bercha

Empirical Weathering Properties of Oil in Snow and Ice, lan Buist

BIOLOGY

Large-scale Movements and Habitat Characteristics of King Eiders throughout the Nonbreeding Period, Laura Phillips

Susceptibility of Sea Ice Biota to Disturbances in the Shallow Beaufort Sea. Phase I: Biological Coupling of Sea Ice with Pelagic and Benthic Realms, *Bodil Bluhm*

Foraging Ecology of Common Ravens (Corvus corax) on Alaska's Coastal Plain and its Relationship to Oil and Gas Development, Stacia Backensto

Analysis of Variation in Abundance of Arctic Cisco in the Colville River: Analysis of Patterns in Existing Data*, Franz Mueter

Locating Overwintering Fish Habitat, Sagavanirktok and Colville Rivers/Beaufort Sea*, Claude Duguay

The Coastal Marine Institute at the University of Alaska Fairbanks: An Overview of CMI and Synopsis of Two Recently Approved Studies, Vera Alexander

Ongoing Projects of the Department of Wildlife Management, North Slope Borough*, Robert Suydam and Craig George

PROTECTED SPECIES

Demography and Behavior of Polar Bears Feeding on Stranded Marine Mammal Carcasses, Susanne Miller Polar Bear Population Monitoring Workshop, Craig Perham

Status of King and Common Eider Migrating Past Point Barrow*, Robert Suydam

Population Structure of Common Eiders Nesting on Coastal Barrier Islands Adjacent to Oil Facilities in the Beaufort Sea, Sarah Sonsthagen

Breeding Biology and Habitat Use of King Eiders on the Coastal Plain of Northern Alaska, *Rebecca McGuire* Protocol to Deflect Migrating Bowhead Whales Away from an Oil Spill: Status Report, *W. John Richardson* Analysis of Covariance of Human Activities and Sea Ice in Relation to Fall Migrations of Bowhead Whales,

W. John Richardson

Distribution and Abundance of Harbor Seals in Cook Inlet: Seasonal Variability in Relation to Key Life History Events, *Peter Boveng*

Seasonal Distribution and Abundance of Steller's Eiders in Cook Inlet, William Larned

Movements and Habitat Use of Harbor Seals in Cook Inlet, Peter Boveng

Aerial Photography of Bowhead Whales to Estimate the Size of the Bering-Chukchi-Beaufort Population*, David Rugh

SOCIAL SCIENCE AND ECONOMICS

Quantitative Description of Potential Impacts of OCS Activities on Bowhead Whale Hunting and Subsistence Activities in the Beaufort Sea*, Michael A. Downs

The North Slope Economy: 1965 to Present*, Leah Cuyno

Researching Technical Dialogue with Alaskan Coastal Communities: Analysis of the Social, Cultural,

Linguistic, and Institutional Parameters of Public/Agency Communication Patterns*, Michael A. Downs

Social and Economic Assessment of Major Oil Spill Litigation Settlement, John Petterson

Annual Assessment of Subsistence Bowhead Whaling near Cross Island 2004, Michael Galginaitis

A Study of the Drift Net Fishery and Oil/Gas Industry Interactions and Mitigation Possibilities in Cook Inlet, Ed Glazier

Subsistence Mapping: Nuiqsut, Kaktovik, and Barrow*, Stephen R. Braund

Attachments

I Agendas

Information Transfer Meeting in Anchorage Information Update Meeting in Barrow

II Attendee Lists

Information Transfer Meeting in Anchorage Information Update Meeting in Barrow

SIGNIFICANT CONCLUSIONS: Not applicable.

STUDY RESULTS: A proceedings of the Tenth Information Transfer Meeting and Barrow Update Meeting were compiled. The proceedings include short summaries of each presentation and edited transcripts of the discussion following each talk. The agendas and attendee lists are also included.

STUDY PRODUCTS: MBC Applied Environmental Sciences. 2005. Proceedings of the Tenth MMS Information Transfer Meeting and Barrow Information Update Meeting. OCS Study MMS 2005-036 Prepared by MBC Applied Environmental Sciences, Costa Mesa, CA. Prepared for the U.S. Dept. of the Interior, Minerals Management Service, Alaska OCS Region, Anchorage, AK. 112 pp. plus attachments.

^{*} Presentation also given at the Barrow Information Update Meeting.